

Amendments to the Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

1-9. (Canceled).

10. (Currently Amended) A ~~first~~ wireless transmit/receive unit (WTRU) ~~capable of canceling interference from a second WTRU in a neighboring cell, the first WTRU comprising:~~

an antenna configured to receive ~~for receiving~~ signals including a first signal of the ~~first~~ WTRU, a second signal of a device other than the WTRU, ~~the second WTRU~~ and a third signal indicating a code of the second signal;

a sampling device configured to sample the first, second and third signals from the antenna and produce a received vector;

a signal receiver configured to determine ~~for determining~~ the second signal code using the received third signal;

an interference canceller configured to cancel ~~for canceling~~ the second signal from the received vector, producing an interference canceled signal; and

a data detection device having an input configured to receive the interference canceled signal for recovering data of the first signal.

11. (Currently Amended) The ~~first~~ WTRU of claim 10 wherein the interference canceller includes:

a second code generation device configured to produce ~~for producing~~ a code of the second signal;

a weighting device, coupled to a root mean squares (RMS) measuring device, configured to weight ~~for weighting~~ the produced code;

a subtractor configured to subtract ~~for subtracting~~ the weighted produced code from the received signals, producing a subtracted signal;

the RMS measuring device configured to measure ~~for measuring~~ a RMS of the subtracted signal; and

a data detector having an input configured to receive the subtracted signal for detecting data of the first signal.

12. (Currently Amended) The ~~first~~ WTRU of claim 10 wherein the interference canceller includes;

a second WTRU joint detector configured to detect ~~for detecting~~ data of the second signal using the second code;

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Application No.: 10/735,936

an interference reconstruction device configured to produce ~~for producing~~ a contribution of the second signal to the received signals;

a subtractor configured to subtract ~~for subtracting~~ the second signal contribution from the received signals, producing a subtracted signal; and

a joint detector having an input configured to receive the subtracted signal and for detecting data of the first signal.

13-15. (Canceled).